

**EXHIBIT 4**

# Your VALET®

## 710T

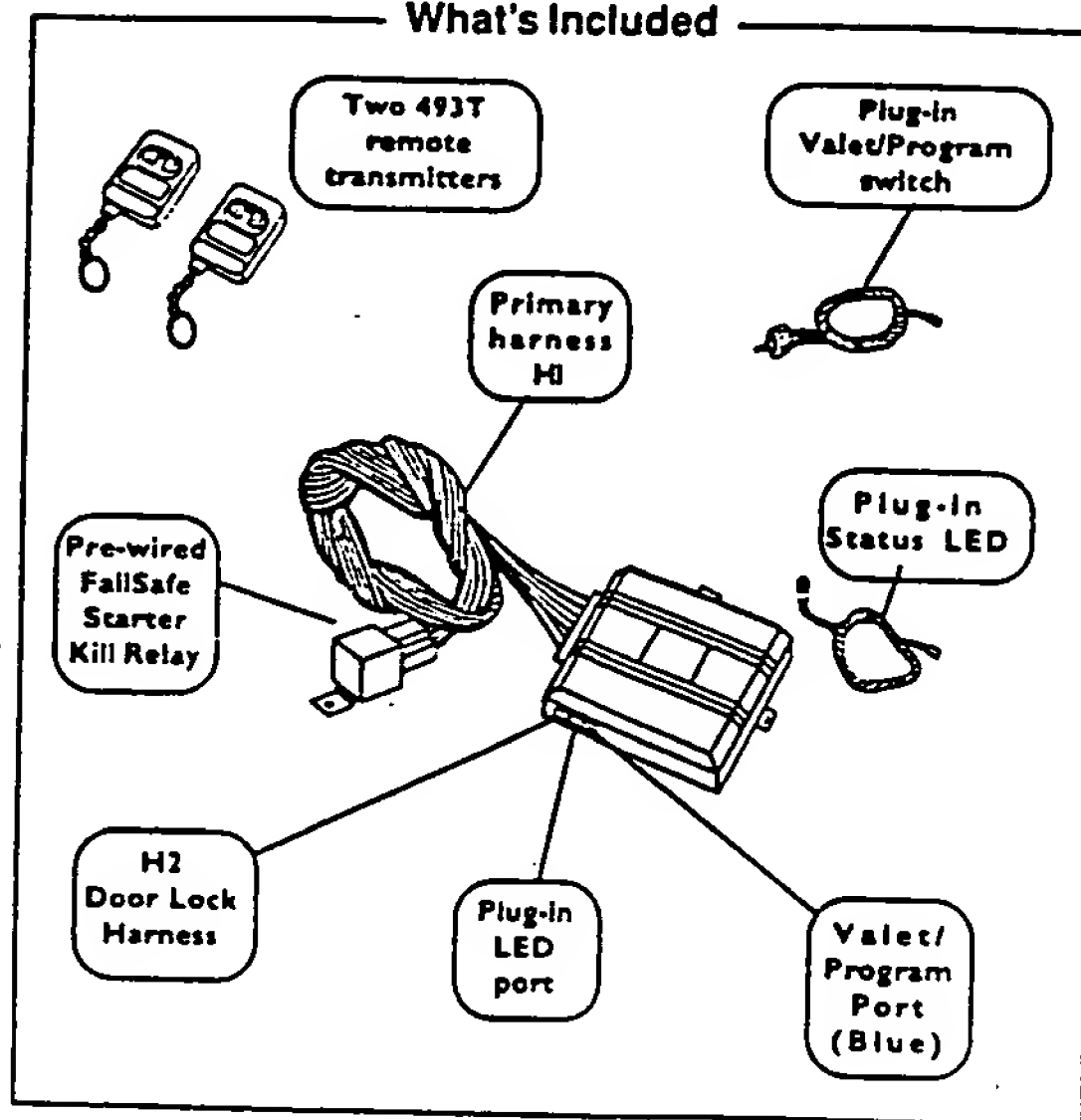
Remote Keyless Entry System

# INSTALLATION GUIDE

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### What's Included



*THIS SYSTEM has been designed to provide the ultimate in convenience to both the dealer and the end user. The microprocessor at the heart of the system utilizes a sophisticated "Learn Routine" to program transmitters as well as configure operation settings. Transmitter codes and operations settings are stored in "EEPROM" and will remain in memory even if the system's main power is disconnected for extended periods of time. Please take the time to read this guide thoroughly prior to installing the system.*

*If possible check with the owner for desired placement of the LED and valet program switch.*



Directed Electronics, Inc.

## Transmitter Learn Routine

Transmitters are taught to the system using the Learn Routine. The system will learn up to 4 transmitters. The system only needs to learn the button that will lock the doors. All other channels are assigned automatically. To enter the Transmitter Learn Routine:

1. Key Turn on the ignition to the run position. The yellow wire (H1/4) must be connected.
2. Toggle Flip the toggle switch ON, OFF, and ON. The LED will be on solid, but will begin to flash in groups of two to indicate entry to the learn routine. The horn will honk one long time if connected.
3. Transmit Within 10 seconds, press the button on the transmitter that will be used to lock the doors. It must be button #1. The unit will not accept both buttons pressed together. The LED will flash three times to confirm entry of a transmitter into memory. It will then return to groups of two. The horn will honk once if connected. The unit will accept up to four transmitters.

If button #1 is taught to the unit the transmitter will operate as follows:

- Button 1 Lock/ Panic Mode on if pressed for 2 seconds
- Button 2 Unlock/ Panic Mode off pressed during Panic cycle/Channel 2 if pressed for 2 seconds
- Buttons 1 & 2 Channel 3 output

If button #2 is taught to the unit the transmitter will operate as follows:

- Button 1 Unlock/ Panic Mode off pressed during Panic cycle/Channel 2 if pressed for 2 seconds
- Button 2 Lock/ Panic Mode on if pressed for 2 seconds
- Buttons 1 & 2 Channel 3 output

Pei  
710T

## Operation-Setting Learn Routine

Many of the operation settings of this unit are programmable. They can be changed whenever necessary through a computer-based learn routine. To enter the Operation Setting Learn Routine, the valet/program toggle switch must be plugged into the blue port on the side of the unit.

NOTE: When using a master dealer remote, the 710T will operate according to the dealer default settings only. See page 12. The settings may only be customized using a standard binary remote.

1. Key Turn the ignition key on and then back off. The yellow (H1/4) ignition input must be connected.

2. Choose Within 10 seconds, flip the toggle switch on and then off the number of times corresponding to the number of the feature you would like to change.

Feature Number	Lock Button Setting (LED solid)	Unlock Button Setting (LED out)
1	Active arming	Passive arming
2	Ignition-controlled door locks	Standard door locks
3	Passive locking on	Active locking only
4	Chirp on	Chirp off
5	Domelight on for 30 seconds when key is turned off	No domelight on when key is turned off

3. Toggle On Once you have selected the desired feature, flip the toggle switch to the on position. The LED will indicate the feature you have selected by blinking that many times. The horn will also honk the same number of times (if it has been connected).

4. Transmit The transmitter is used to select the desired setting. As shipped the unit is configured to the bold settings. Those are called the default settings. Pressing the lock button (usually button #1) will set the setting to the lock button setting. The LED will light solid (stop flashing) to indicate the setting. The horn will honk once (if connected). Pressing the unlock button (usually button #2) will change the setting to the unlock button setting. The LED will go out indicating the change and the horn will honk twice if connected.

5. Toggle Off Flip the toggle switch back to the off position.

Let's say that you want to program the system to passive arming. After cycling the ignition key, flip the valet switch on and then off to select the feature number 1. Then flip the toggle switch to the on position. The LED should begin to flash in groups of one. Next, press the unlock button (button #2 in most cases) and the LED will go out. Once the toggle switch is turned back off the unit is set to passive arming.

You can advance from step to step by using the toggle switch. This is done by flipping the valet switch off and then flipping on and off the number of times necessary to get from the step you are programming to the desired step. For example, if you just programmed feature number 1 and you would like to access feature number 5, flip the valet switch back off, flip it on and off four times, to access feature 5 and then flip it to the on position. The LED will flash 5 times to indicate access to step 5.

Learn Routine will be exited if:

- The key is turned on.
- More than 10 seconds elapses between steps.
- The valet/program switch is operated too many times.



# EXCALIBUR

of America

# K-9 CAR ALARM

## Vehicle Security Trusted By Over 8 Million People Worldwide.

### Transmitter Verification™

Every time you enter your vehicle, our patent-pending feature will indicate how many UNAUTHORIZED transmitters have been coded to operate your alarm.

### Code Learning

Adding or deleting factory coded transmitters is as easy as pressing a button - giving you the comfort of knowing that your transmitter codes are concealed and protected from thieves.

### Code Jumping™

New technology that is capable of preventing "Code Grabbers" from disarming your security system.

### Battery Back-Up

When main battery power is interrupted, the Battery Back-Up feature will maintain essential security functions, assuring the protection of your vehicle.

### Insurance Discounts Available

Excalibur and K-9 alarm systems meet the requirements for auto insurance discounts.

### Also Available:

- Starter Interrupt
- Anti-car jacking
- Trunk Release

All these features and more  
**PLUS**

Excalibur and K-9's  
"No Nonsense" Lifetime Warranty  
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Excalibur and K-9 are divisions of Omega Research and Development, Inc.

CIRCLE NO. 6 ON READER SERVICE CARD



# Learning Transmitter Code

**Transmitter Code Learning:** This security system will respond to up to 4 different transmitters. This security system already has two transmitters programmed into the system memory.

When adding or deleting transmitter codes to operate your security system, follow this process:

1) Turn "on" the ignition.

2) Within 5 seconds of turning "on" the ignition, press the valet button 5 times.

Note: Siren will chirp, confirming that for the next 10 seconds it's ready to learn a transmitter code.

Note: If a code is not received within 10 seconds, the learning process will automatically terminate.

Note: When the first transmitter code is learned it will erase all other prior codes and thus protect your alarm against unknown codes being entered without your knowledge.

3) To learn the first transmitter button codes:

Step A. Within 10 seconds of step #2, press the transmitter button you want to arm/disarm/panic the system until you hear one siren chirp to confirm that the code was learned and that the system is ready to learn the trunk release code.

Step B: Within 10 seconds of step A, press the transmitter button you want for trunk release activation until you hear two siren chirps that confirm that the code was learned and that the system is ready to learn the third channel output code.

Step C. Within 10 seconds of step B, press the transmitter button you want for #3 channel activation until you hear three siren chirps that confirm that the code was learned and that the system is ready to learn the 2nd, 3rd or 4th transmitter codes starting at step A.

4) To program the second, third or fourth transmitter codes, repeat steps A, B, & C.

Note: If the valet button is pushed once before step B or C, the system will advance to learn the next transmitter codes starting at step A. Thus, no code is learned in step B and/or C from the transmitter.

5) Turning off the ignition, or 10 seconds of no activity, will automatically turn off this transmitter learning code program, which is confirmed by one long sounding chirp.

## Programming Functions

Programming functions allow the user to select options in several of the basic features of the system. Access to all programming functions requires that the ignition switch is in the "on" position. Selections are then made through the Transmitter.

**Arm Mode Selection.** Set arming mode to either Automatic or Remote.

1. Ignition on.
2. Press both transmitter buttons (on the 6500: Button 1 and any other) within 4 seconds.
3. On the first push, the siren will chirp one time indicating:

Automatic arming with chirp response.

Second push: two chirps = Remote arming.

Third push: three chirps = Automatic arming with no chirp.



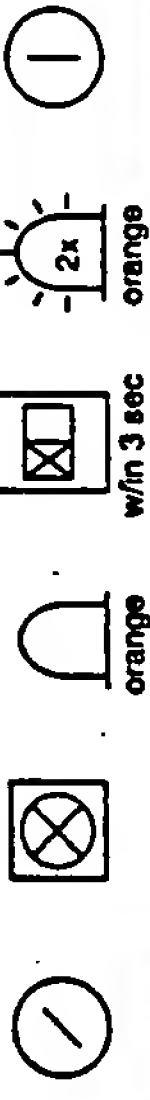
**Transmitter Code Learning.** For programming additional Transmitters. Each Transmitter may be programmed with either a chirp or no chirp.

**To code the Transmitter with chirp:**

1. Ignition on.
2. Press and hold the Override Switch. The Warning/Status Indicator LED will glow orange.
3. Without releasing the Override Switch, press the Transmitter button you wish to control the system

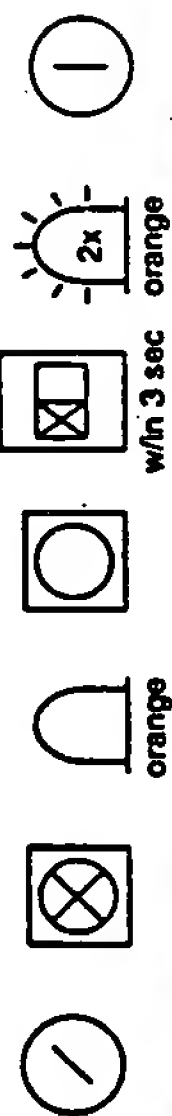
within 3 seconds. The LED will blink orange twice, indicating that the code was received.

4. Ignition off.



**To code without chirp:**

1. Ignition on.
2. Press the Override Switch. The Warning/Status Indicator LED will glow orange.
3. Release the Override Switch and press the Transmitter button within 3 seconds. The LED will blink orange twice.
4. Ignition off.

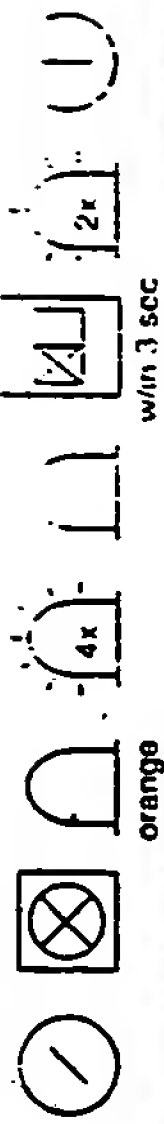


**Transmitter Recoding.** Allows you to erase all existing Transmitter codes and replace them with new ones.

**To recode with chirp:**

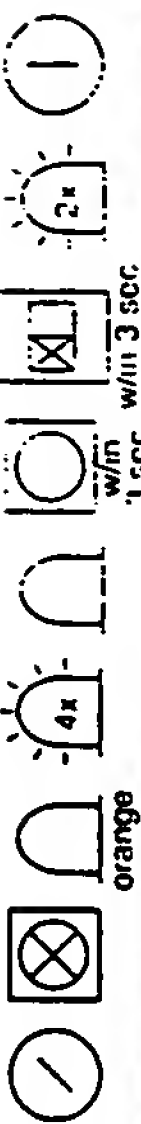
1. Ignition on.
2. Press and hold the Override Switch. The Warning/Status Indicator LED will glow orange, blink 4 times, then glow again.
3. Without releasing the Override Switch, press the Transmitter button within 3 seconds. The LED will blink twice to indicate that the code has been learned.

4. Ignition off.



**To recode without chirp:**

1. Ignition on.
2. Press and hold the Override Switch. The LED will glow orange, blink 4 times, then glow again.
3. Release the Override Switch and press the Transmitter button within 3 seconds. The LED will blink twice.
4. Ignition off.



**Remote LogicSensor Adjustment.** Allows you to adjust the motion and impact sensitivity of the LogicSensor. 6000 Series systems provide two levels of sensitivity adjustment.

The first level is set by the installer according to the requirements of the vehicle and the desired sensitivity of the user. LogicSensors come pre-set from the factory at the "medium" setting.

The second level is adjustable by the user, according to changing needs or conditions. It is possible to turn the sensor completely off or adjust to low-medium-high within the range selected during installation.

**NOTE:** If the LogicSensor has been turned off, the siren will respond with three chirps each time the system is armed.

Ungo 6000

# COPE ALARM ELITE 950

## TRIP ID

When an alarm cycle is triggered the ID of the zone that triggered the alarm cycle is stored by the system center in a special memory location called the event memory. To recall the information stored in the event memory, follow these steps:

- Disarm the security system and enter vehicle.
- **Do not rearm the security system or turn ignition key on, this erases the event memory.**
- Press emergency override button.
- The siren will emit a series of chirps.
- Use the chart on the right to identify how the alarm cycle was triggered.

Chirps	Trigger
1	Shock Sensor MV-1
2	Ignition Key turned on (attempted "hot-wire")
3	Open Door (most FORD vehicles)
4	Open Door (most other vehicles and/or Open Hood or Trunk)

## ADDING AND DELETING REMOTE CONTROL TRANSMITTER CODES

Code Alarm, Inc. vehicle security systems are equipped with a special code learning feature that allows you to program new transmitter codes to the system or delete old ones. The system can learn up to four unique transmitter codes. The four transmitter codes can all be the same one or different ones.

### To add a new transmitter:

1. Open the driver's door (leave open until finished).
2. Turn ignition key to the on position.
3. Press and hold the override button.

In 15 seconds the siren will chirp 3 times and doors will lock/unlock 3 times. Continue holding the emergency override button. The system is now in CODE LEARNING mode.

4. Press BUTTON 1 on the new transmitter.

The system will respond by chirping the siren once and locking/unlocking the doors once. Any additional transmitters can also be programmed at this time. You need not exit and re-enter code learn mode.

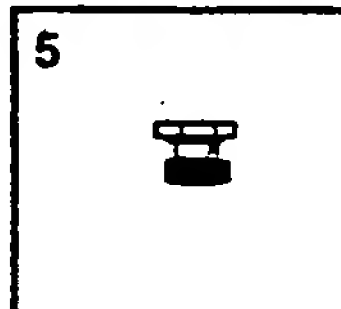
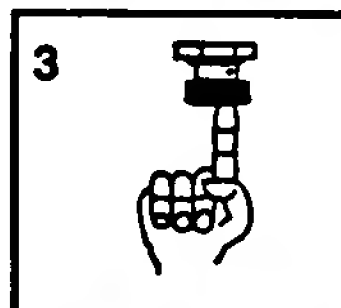
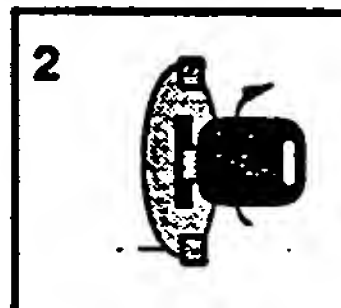
5. Release emergency override button to exit learn mode.

### Deleting old transmitter codes:

To delete an old transmitter code, enter CODE LEARNING mode and reprogram all current transmitters to the system. Program four transmitter codes to the system. If you have two current transmitters, reprogram each one twice. If you have three current transmitters reprogram two of them once and the third one twice. This process will leave only current transmitter codes in memory.

### SPECIAL NOTE

Make sure no one else is operating their security system within range of your vehicle when programming transmitter codes. If someone else were to operate their remote control while you are programming your codes, it is possible their transmitter code will be programmed into your system, allowing them unauthorized access to your vehicle.





# BULLDOG

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# 24

## REMOTE CONTROL COMMANDS

**KEYLESS  
ENTRY!**

With or without engine running

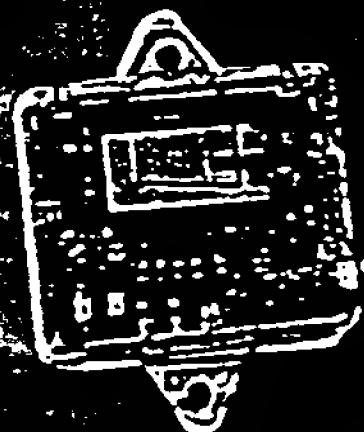
**AUTOMATIC  
DOOR LOCK**

**SILENT  
ARMING**

**NO FALSE  
ALARMS!**

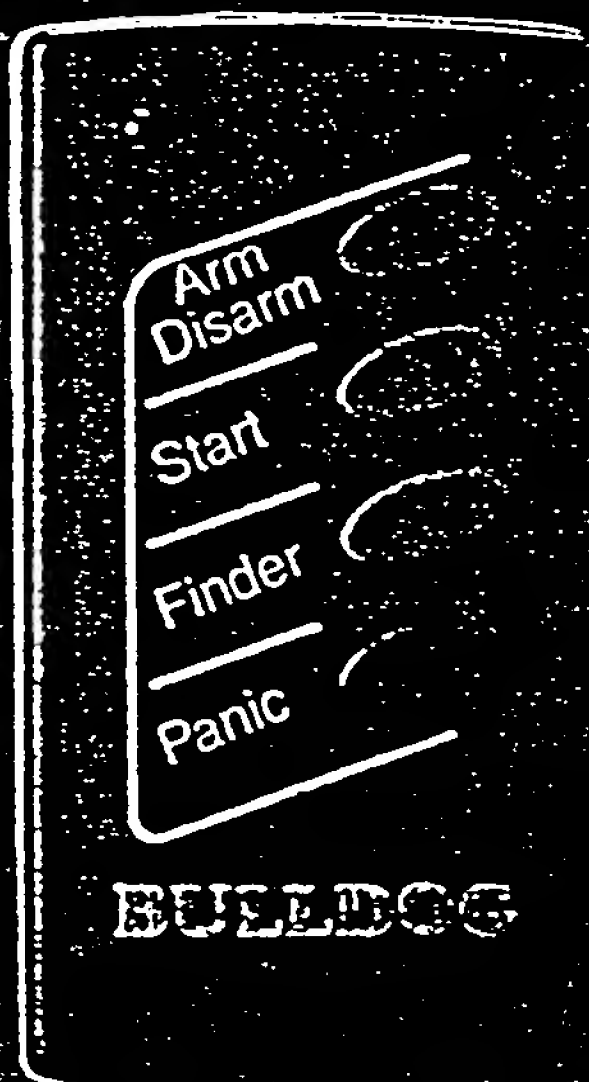
**STARTER  
DISABLE**

**SMALLEST,  
MOST SENSITIVE  
DUAL STAGE  
SHOCK SENSOR  
EVER MADE!**



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**AUTOMATIC  
ANTI-CAR  
JACKING**

**WARN AWAY  
CHIRP**

For high theft areas

**PASSIVE  
ARMING**

**FULL TIME  
INSTANT PANIC**

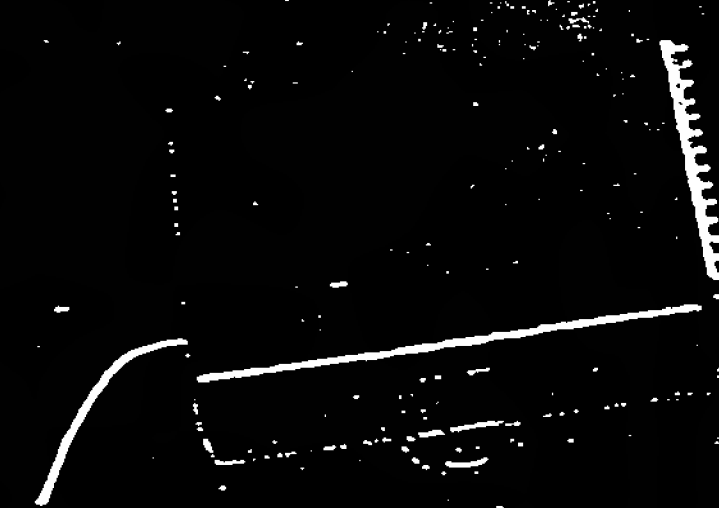
With or without engine running

**CAR  
FINDER**

**REMOTE CAR  
STARTER  
(OPTIONAL)**

## EASY TO USE!

MODEL 7002 PRO



Space age technology made this alarm possible, USA engineering and robotic assembly make it affordable

The 7002PRO has the following features:

- Two 4-Button easy to use remote controls • 2 free extra clear remote control transmitter shells • silent arming/disarming • arm confirmation chirp • disarm confirmation chirp • three chirp confirmation when disarmed if violated • 6 function -LED status • 6 tone 126 decibel siren • automatic passive last door arming (programmable) • progressive door pins • progressive alarm activation • ignition system detection • automatic door lock/unlock with ignition switch (programmable) • automatic car starter by-pass • keyless entry with or without engine running • negative output trigger • 6 separate input triggers • negative door pin trigger input • positive door pin trigger input • shock sensor-negative input • current sensing • remote car finder • full time instant panic even with engine running • parking light-output • starter kill-output • valet • code learning • remote control programming • programmable: sensor bypass, passive arming/active arming, .5 and 3.5 second door lock pulse, door lock with ignition, passive/active arming doors locking, 30 second chirp for hi theft areas • automatic anti-car jacking • three negative outputs • passive/active arming doors locking • starter disable relay and socket



CORPORATE OFFICE 350 Cadiz Avenue Wintersville, Ohio 43952  
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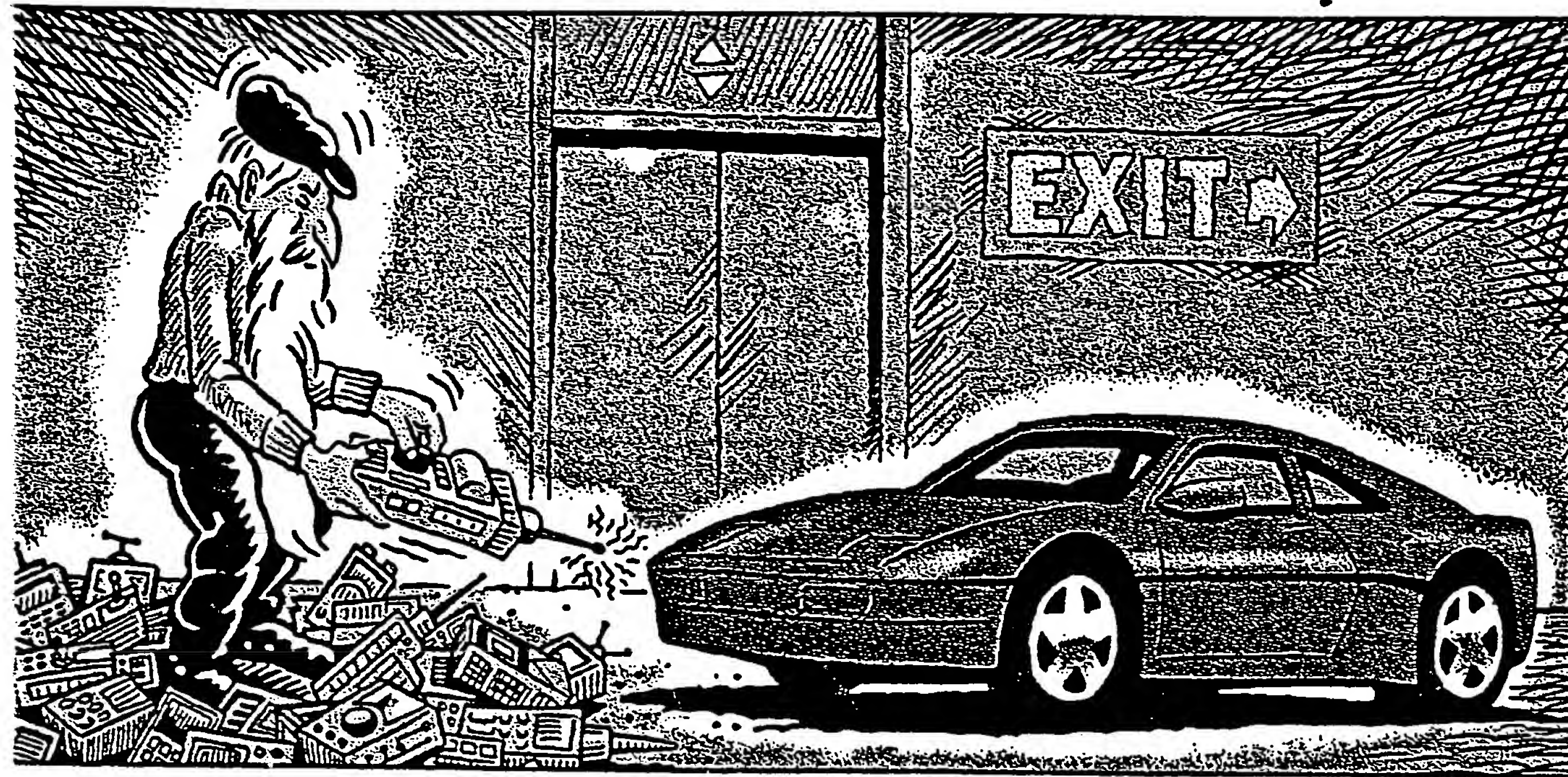
**Proudly made in the U.S.A.**

Circle # 24 on Reader Service Card



# SOME PEOPLE NEVER LEARN!

## With CODEBUMP™ technology, code grabbing is a thing of the past.



### Now with 3-button transmitter and 3-channel receiver.

Be prepared for today's car thieves with SECO-LARM®'s new ENFORCER® 200A8, featuring patented CODEBUMP™ technology. With CODEBUMP, the alarm's RF code changes every time the transmitter button is pressed. In addition, with over 18 quintillion ( $1.8 \times 10^{19}$ ) codes, the chances of ever repeating a code are virtually non-existent. So-called "code-grabbers" and "scanners" are rendered obsolete - a thing of the past.

The ENFORCER® 200A8 also comes with all of these advanced features:

- Two 3-button transmitters and 3-channel receiver for remote-controlled operation of trunk, car starter, etc.
- Code learning of up to 5 different transmitters utilizing EEPROM microprocessor.
- Patented 2-stage electromagnetic shock sensor with built-in pre-intrusion alert to warn off thieves.
- Quiet Chirp™ and Quiet Mode to avoid disturbing your neighbors when arming and disarming.



## SECO-LARM®

17811 SKY PARK CIRCLE, SUITE D & E  
IRVINE, CA 92714

(800) 662-0800, Calif. (714) 261-2999 FAX (714) 261-7326

Circle No. 46 On Reader Service Card

# NEW 1993 FEATURES

The 1993 Viper Ultra models have several new features not addressed in the installation guide.

Nuisance Prevention Circuitry prevents intermittently-triggering sensors from becoming a problem.

It:

- The system "sees" the same zone trigger three times

- The triggers are spaced less than an hour apart

The system will bypass that input zone for 60 minutes.

If that zone does not attempt to trigger the system during the 60-minute bypass period, the zone's monitoring will begin again at the end of the hour.

If the system "sees" a trigger on the bypassed zone, the 60-minute bypass timer will reset, and the zone will be bypassed for 60 minutes from the last trigger signal.

Disarming and rearming the system does not reset NPC. The only way to reset NPC is for the 60 minutes to pass without a trigger attempt, or for the ignition to be turned on. This allows the system to be repeatedly triggered, disarmed and rearmed, and still allow NPC to bypass a faulty zone.

NPC means that you must change the way you test the system. Fortunately, 1993 units also include a new Test Mode.

Test Mode allows the installer to test all triggers of the system without constantly sending the system into the alarm modes. Used properly, it greatly speeds up the testing phase of the installation.

**IMPORTANT!** If attempting to test the system without using Test Mode, remember that NPC may defeat the trigger input (see above).

The first stage of Test Mode, Quick Test, allows any trigger input to be tested (except ignition). As each zone input is triggered, the Status LED provides identification of the zone involved (see the Table of Zones). In addition, the siren chirps once at the beginning of the trigger signal and once at the end of the trigger signal. Thus, sensors, with their short output pulses, cause two quick chirps, while pin switches provide one chirp at the beginning of the signal as the door (trunk, hood, etc.) is opened and another chirp when closed and the signal ceases.

The second stage, Zone Test, lets you test one zone at a time. While in this stage, the Status LED only advises you of which zone can be tested, while the siren chirps still notify you at the beginning and at the end of trigger signals.

To enter Test Mode:

Press and hold the Valet/Program switch.

Turn ignition on and off.

Release the Valet/Program switch, and then press it and release it again. You will hear one chirp. You are now in the first stage of Test Mode.

To step to Zone Test, press the arm/disarm button twice.

# TRANSMITTER/RECEIVER CODE PROGRAMMING (1993 AND NEWER SYSTEMS)

**NOTE:** In order for the Viper Ultra 900/950 to enter the transmitter code learn routine, the black loop in the two-pin connector at one end of the module must be open, or removed.



1 - Open a door and leave it open.



2 - Turn on the Ignition



3 - Tap the Valet/Program switch the appropriate number of times to access the receiver function you need to program. Each time the switch is released, you will hear one chirp.



4 - When you have heard the appropriate number of chirps, press the transmitter button you wish to control that function. One long chirp confirms programming.

**IMPORTANT:** Two loud siren chirps announce that the system has exited the coding program learn routine.

During programming, the system will immediately exit learn routine if:

- Ignition is turned off.
- All doors are closed.
- More than 15 seconds elapses between steps.
- Valet/program switch is pressed 7 times successively.

For example, if you wanted to program the system so that receiver function four was controlled by transmitter button II, you would press the switch four times. You would hear four confirmation chirps, and see LED flashes in groups of four. You would then press button II on the transmitter, and two seconds later you would hear a long chirp confirming that the system has accepted, or learned, your programming.

Remember, all channels are not programmed yet, so you may assign them yourself. Also remember your two transmitters are coded differently, so you must program both.

**NOTE:** If one transmitter channel is programmed into two receiver functions, the lower-numbered receiver function is the only one that will operate.

Receiver function one	Arm/disarm/panic
Receiver function two	Silent mode/trunk release relay
Receiver function three	Output continuous through transmission. When channel three is programmed for Valet Start, the doors will lock. If used while armed, the Warn-away inputs are bypassed.
Receiver function four	On/off output. Can be used to turn sensors or relays on and off. Can be converted to a pulsed output with a 452T pulse generator. NOTE: Never wire a relay so it remains continuously energized after the ignition is turned off.
Receiver functions five and six	Outputs continuous through transmission. Perfect for 529T power window control, garage door control, or other optional applications.

Ultra 900



## START ME UP

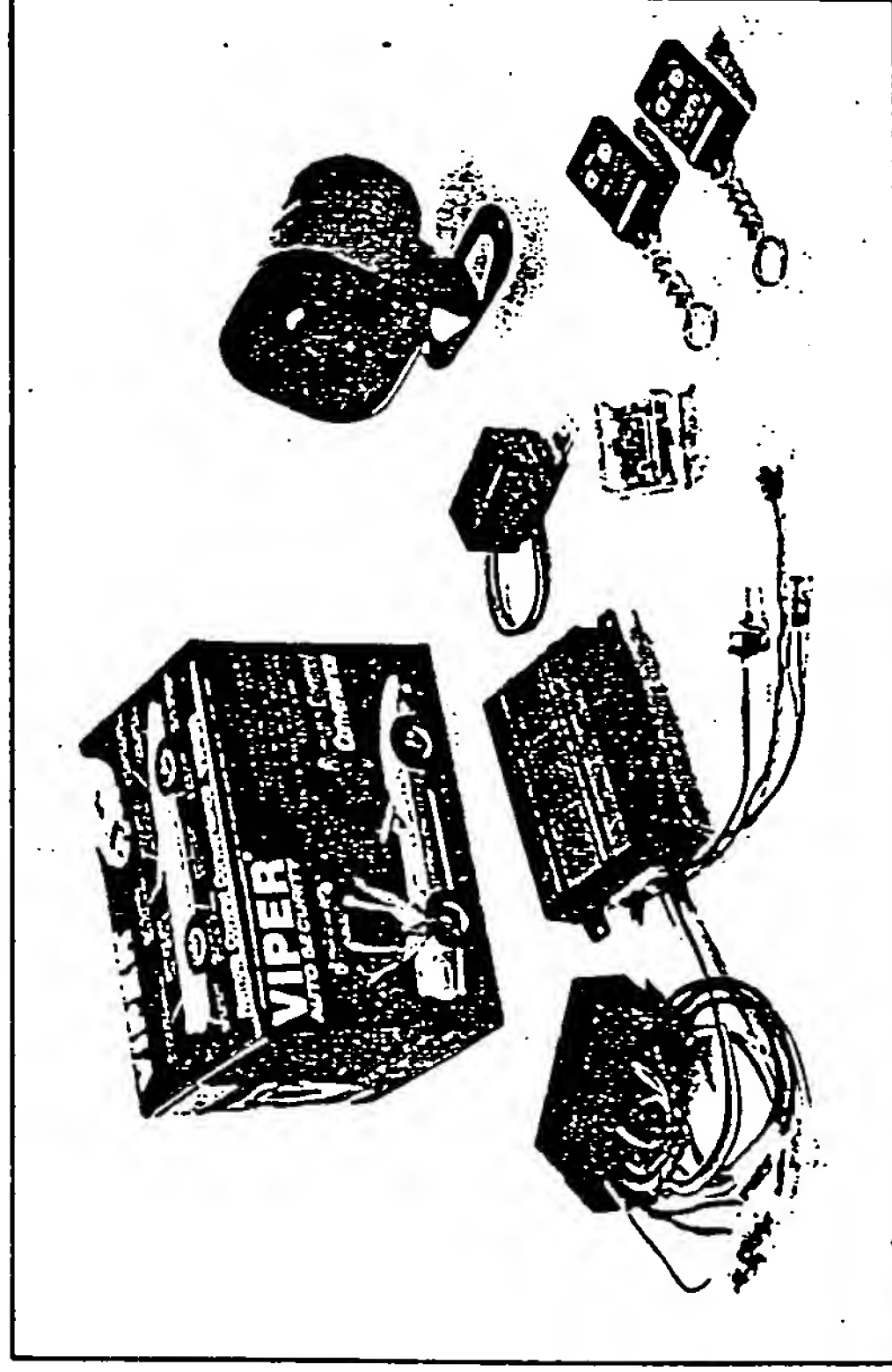
Just in time for the cold and flu season, Directed Electronics, Inc. introduces the 553 Series of remote-engine-starting vehicle security systems.

No more freezing seats and steering wheels. No more trudging to the curb, starting the car, running back inside while the engine warms up. No more wondering if the car will start at all after a below-zero night.

With three channels, the 553 Series makes it easier than ever to get into remote start. The 553s will be available in the Viper, Python and Sidewinder lines. The remote-start capability is for all gas-powered, fuel-injected automatic-transmission vehicles.

Other advanced remote-start features in the 553 Series include automatic restart in extreme weather and selectable engine running time to avoid wasting gas. For example, a vehicle could start itself every three hours, run for up to 24 minutes, then shut down for three hours. This cycle can be repeated up to six times.

Security/safety/convenience features include built-in Code Hop-ping technology to keep code grabbers away; two 2-button transmitters with up to 150-foot range and more than 500 million security codes; scan-deterrent receiver; two Warn-Away modes; warn-only and warn-trigger; Slinger, Double Guard, shock/impact sensor; six-tone Revenger programmable siren; Failsafe starter; kill-ready connections, parking light flash relay; dual-polarity lock outputs; Nuisance Prevention Circuitry; Remote Valet; plug-in valet switch; Silent Mode; super-bright five-function status LED; five-zone diagnostic reporting with error bypass; domelight supervision output; ignition-controlled door lock and unlock; Mercedes/Audi lock timing; Learn Routine; lifetime warranty; Guaranteed Protection Plan that refunds up to \$2,500 of insurance deductible even if stolen car is recovered; and Directed's famous Nationwide Assistance and Warranty Plus programs for buyer peace of mind.





ATTN: STEVE NIELSEN

SIDEWINDER 6000 HF

OPERATING-SETTINGS LEARN ROUTINE™

Many of the operating settings of this unit are programmable. They can be changed whenever necessary through a computer-based learn routine. In order to access learn routine, the jumper underneath the sliding door on the module is used in the learn position (see page 10). The valid program button switch, plugged into the blue port is used in conjunction with a program on transmitter to change the settings. To program settings remember: Door, Key, Choose, Transmitter and Release.

1. Door Open a door. Either the green (11/1) or the blue (11/15) door trigger wire must be connected for the control unit to "see" an open door.

2. Key Turn the ignition on and then back off. The yellow (11/14) switched ignition input must be connected.

3. Choose Within 15 seconds, press and release the valid program button the number of times corresponding to the number of the desired feature (see the chart below).

Feature Number	One-chip setting	Two-chip setting
1	Active arming	Passive arming
2	Armed/learn chips on	Armed/learn chips off
3	Ignition-controlled door locks	Standard door locks
4	Active locking only	Passive locking
5	Panic with ignition on	No panic with ignition on
6	Standard door lock pulse duration (0.8 second)	Marked/learn door lock pulse duration (5.5 seconds)
7	Forced passive arming on	Forced passive arming off
8	Automatic engine disable on	Automatic engine disable off
9	VRS enabled	VRS disabled

Once the button has been pressed and released the correct number of times press it once more and hold it. After a second, the green light will indicate what gap you have accessed. For example, three chips would indicate access to the ignition controlled door lock feature.

4. Transmitter While holding the valid program button, use the armed/learn button of the transmitter, to toggle between the one and two chip settings. The one-chip settings are the factory defaults.

5. Release The program button can now be released. For example, to program the arming mode from active to passive, press and release the valid program button once. Then press and hold it. The sign will chirp once, indicating that the setting can now be changed. While holding the valid program button, press the armed/learn button on the transmitter. The sign will chirp twice to indicate that passive arming has been programmed. If this is the desired setting, release the valid program button. If this is not the desired setting, continue to hold the valid program button and press the armed/learn button on the transmitter again. The sign will chirp once indicating that active arming has been programmed. Once the desired setting has been selected, release the valid program button.

You can also program step by step by pressing and releasing the valid program button the number of times necessary to get from the first step to the step you wish to access. If you just programmed the armed/learn chips feature, the sign will chirp once. If you want to program passive locks, press the valid button, press and release it twice to step into feature two to feature four. Then press it once more and hold it. The unit will chirp four times to confirm that you have accessed feature number four.

The learn routine will be exited if:  
• The door is turned on. • The valid button is pressed too many times.

• More than 15 seconds elapses between steps.

The sign will emit a long chirp when Learn Routine is exited.

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SYSTEM POWER-UP

1. Double check all connections, making sure they are secure and well insulated.
2. Turn the ignition key to the "RUN" position.
3. Replace the main power fuse on the module RED wire.
4. If not going directly to the next step, turn the ignition off.

TRANSMITTER PROGRAMMING

The transmitters must be programmed to the system prior to option programming, testing and system operation. The system has memory locations for four (4) transmitter codes. ALL FOUR MEMORY LOCATIONS MUST BE FILLED FOR THE SYSTEM TO OPERATE PROPERLY. UNLESS YOU ARE PROGRAMMING MORE THAN TWO TRANSMITTERS TO THE SYSTEM, PROGRAM EACH OF THE SUPPLIED TRANSMITTERS TWO (2) TIMES. IN ANY SITUATION, MAKE SURE THAT FOUR (4) TRANSMITTERS ARE PROGRAMMED TO THE SYSTEM AT ALL TIMES.

1. Open the drivers door and leave open.
2. In not already on, turn the ignition key to the "RUN" position.
3. Press and hold the programming button.  
In 15 seconds the system will chirp the siren and cycle the door locks three (3) times.
4. Release the override/programming button.  
The system is now in the transmitter learn mode.
5. Wait five (5) seconds.

2. BUTTON TRANSMITTERS

6. Press ARM button on the first transmitter.  
The system will chirp the siren and cycle the door locks one time to indicate that this transmitter code has been learned.
7. Repeat step 6 for transmitter #2 (programming each transmitter twice).
8. Turn the ignition key off to exit the learn mode.
9. Close all doors to reset the system operation.

4. BUTTON TRANSMITTERS

6. Press the ARM button on the first transmitter.  
The system will chirp the siren and cycle the door locks one time.
7. Press the TRUNK button on the first transmitter.  
The system will chirp the siren and cycle the door locks two (2) times to indicate that this transmitter code has been learned. If the system only responds with one chirp, the system has learned the transmitter improperly, repeat steps 5 & 6 for that transmitter.
8. Repeat steps 5 & 6 for transmitter #2 (programming each transmitter twice).
9. Turn the ignition key off to exit the learn mode.
10. Close all doors to reset the system operation.

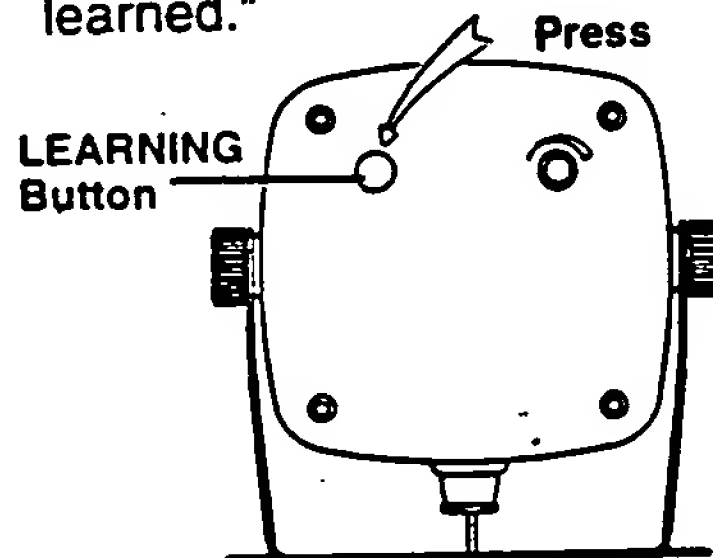
## SYSTEM SETUP

### TEACHING THE CONTROL CENTER THE REMOTE CODE

Before you operate your alarm system, you must teach the control center which remote controls to recognize. This prevents false triggering when remote controls from different car alarms are used nearby.

Follow these steps to teach the control center which remotes to respond to.

1. Press **LEARNING**. The system announces, "Remote code is being learned."



2. Press any button on the remote transmitter. The system announces, "Thank you."
3. Repeat Steps 1 and 2 for the other remote transmitter, if desired.

#### Notes:

- Each remote transmitter has a different built-in security code. If you use both of the supplied remote transmitters, you must teach the control center both remote codes in the same process. Each time you start this process, previously codes are wiped out.
- You might need to relearn the remote codes to the control center if power is lost or disconnected for more than 15 seconds.
- To purchase a replacement remote transmitter, contact your local Radio Shack store.

### TESTING THE SYSTEM

1. Turn the vehicle's ignition on then off, and remove the ignition key.
2. Step out of the vehicle, and close all doors, the hood, and the trunk.
3. Test the following alarm functions using the procedures described in "Operation."
  - Automatic and remote arming
  - Automatic and remote disarming
  - Panic alarm
  - Exit and entry delays

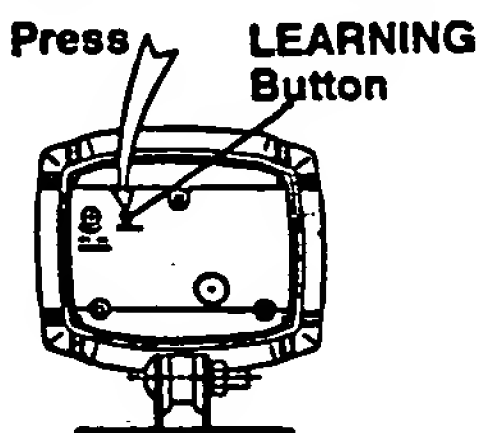
RADIO  
SHACK  
49-741

## ASSIGNING THE REMOTE TRANSMITTER TO THE SIREN MODULE

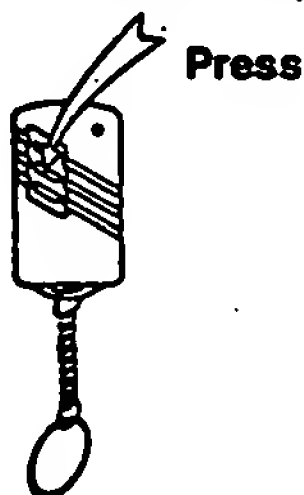
Two different remote transmitters can control the siren module. Your system comes with two remote transmitters. To purchase a replacement remote transmitter, contact your local Radio Shack store.

Follow these steps to assign a remote to the siren module.

1. Unscrew the three screws and remove the siren module's back cover.
2. Press **LEARNING** on the siren module. The siren beeps once.



3. Press any button on the remote transmitter. The siren beeps twice.



4. Replace the three screws securing the siren module's back cover.

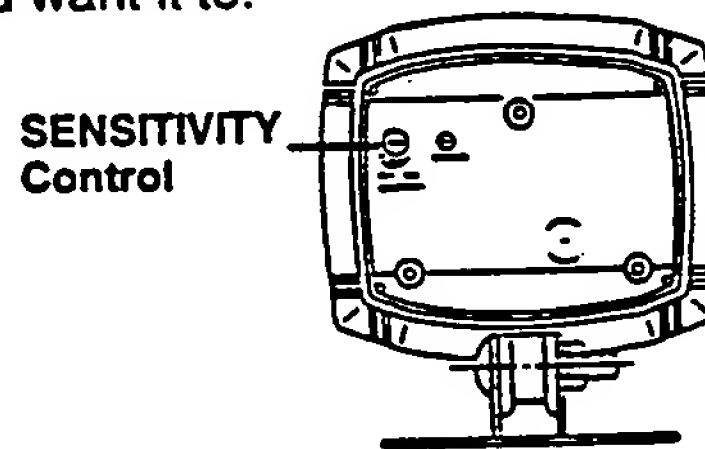
Repeat these steps for the additional remote transmitter.

**Note:** Each remote transmitter has a different built-in security code. The new codes replace the old codes.

## SETTING THE MOTION SENSOR'S SENSITIVITY

The alarm system's motion sensor detects vibrations. You can decrease the sensor's sensitivity by turning the control (under the back cover) counter-clockwise so strong vibrations are required to set off the alarm. Or, you can increase the sensitivity so even slight vibrations sound the alarm.

You must arm the system and push or rock the car to determine the sensitivity. The alarm sounds when you exceed the alarm's sensitivity. Disarm the alarm to silence it. See "Operation" for information about arming and disarming the system. Experiment with different settings until the alarm operates the way you want it to.



## TESTING THE SYSTEM

Follow these steps to test the system.

1. Close all doors, the hood, and the trunk.
2. Turn off the vehicle's ignition.
3. Test your system using the procedures in "Operation." Test the following:
  - Automatic Arming and Disarming
  - Remote Arming and Disarming
  - Panic Alarm
  - Exit and Entry Delays

Radio Shack  
49-771



These factory programmed settings can be prioritized based on an individual frequency of use, (i.e. pressing both buttons simultaneously to activate channel 1, arm/disarm etc.) by following the normal programming instructions below. Please note when changing the button sequences of the factory settings, it is necessary to perform steps 5, 9, and 12 three times using "transmitter A", followed by one time using "transmitter B".

#### PROGRAMMING TRANSMITTERS:

It is important to remember that during programming, each individual step of the procedure must be executed within 15 seconds of the previous step. When the 15 second time limit is allowed to expire, the system will automatically exit program mode. This is indicated by a long "chirp" from the siren. Additionally, any time the ignition key is turned off while programming, the system will immediately exit program mode. This is also indicated by a long "chirp" from the siren.

#### TO PROGRAM ADDITIONAL TRANSMITTERS:

1. Enter the vehicle, and turn the ignition key to the "on" position.
2. Move the valet/bypass switch on - off - on - off - on then off.
3. The dash L.E.D. will flash one time, and the siren will "chirp" one time, indicating the system is ready to accept programming for channel 1, or the arm/disarm and panic functions.
4. You can assign any of the three transmitter button functions listed below to channel 1.
  - a) Pressing button #1 on the keychain transmitter.
  - b) Pressing button #2 on the keychain transmitter.
  - c) Pressing both buttons simultaneously on the keychain transmitter.
5. Press and hold the selected choice a, b, or c above, until the siren emits a long "chirp" to confirm that programming of channel 1 was successful.

6. MOVE THE VALET/BYPASS SWITCH ON, THEN OFF AGAIN.

7. The dash mounted L.E.D. will flash 2 times, and the siren will "chirp" one time, indicating that the system is ready to accept programming for channel 2, or the pulsed ground output for remote trunk release, remote car starter, etc.

8. You can assign any one of the two remaining button functions listed in 4a, 4b, or 4c above to operate channel 2. You cannot use the button(s) that operate channel 1, selected in step 5, to operate channel 2.

9. Press and hold the selected choice. The siren will emit a long "chirp" to confirm that programming of channel 2 was successful.

10. Move the valet/bypass switch on, then off again.

11. The dash mounted L.E.D. will flash 3 times, and the siren will "chirp" one time, indicating that the system is ready to accept programming for channel 3. (APS 300)

12. Press and hold the remaining transmitter button function. The siren will emit a long "chirp" to confirm that programming of channel 3 was successful.

13. To exit program mode, either turn the ignition key to the off position, or move the valet switch on then off one additional time. This is indicated by a long "chirp" from the siren.

#### QUICK REFERENCE:

You can program any individual channel, without reprogramming all channels, by following the quick reference chart below.

CHANNEL	VALET SWITCH	L.E.D.
1	ON then OFF 3 Times	1 Flash
2	ON then OFF 4 Times	2 Flashes
3	ON then OFF 5 Times	3 Flashes

After the desired channel is programmed, turn the ignition key to the off position to exit programming mode.

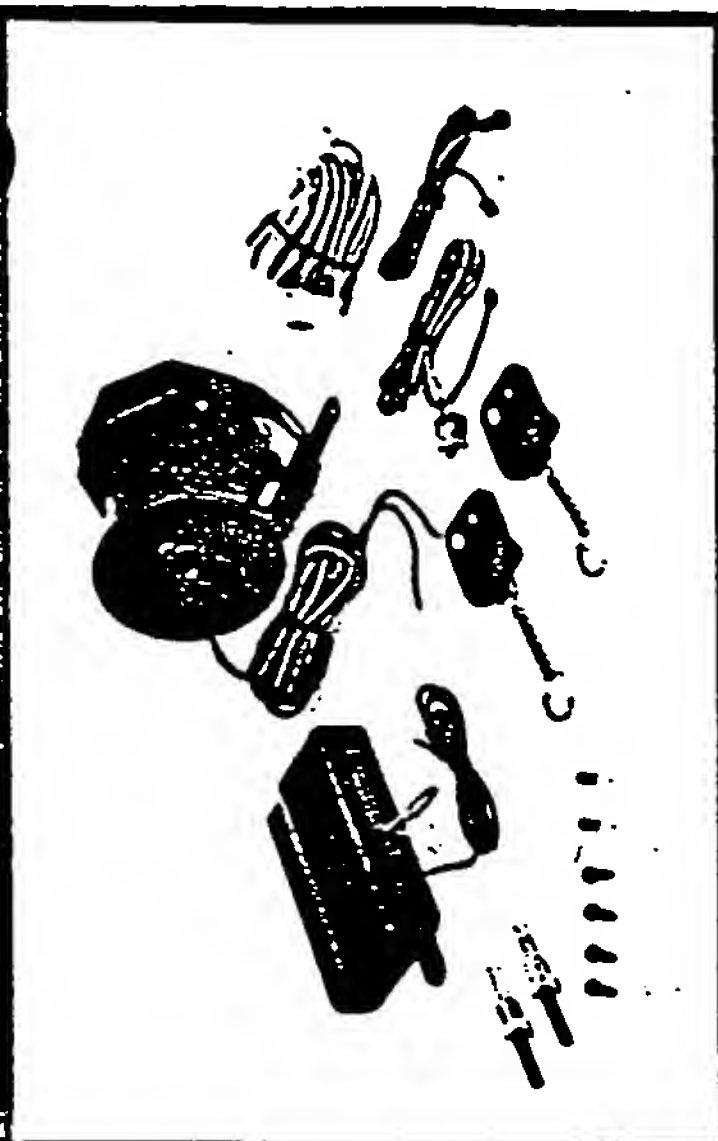
The transmitter should be used to program the system as the battery is fully charged.  
1. Remove the transmitter from the vehicle.  
2. Remove the contact from the transmitter.  
3. Install the transmitter in the proper position.  
4. Replace the contact on the transmitter.

Audiovox

APS-300

# FBI CAR ALARM

Since 1970,  
More Than 8 Million People World-Wide  
Have Trusted Their Vehicles Security  
To the Makers Of  
FBI Car Alarms



**MODELS:**  
**FBI-410**  
**FBI-411**  
**FBI-515**  
**FBI-517**

**AFFORDABLE PROTECTION**  
**SOLID AS STEEL!**

# FBI CAR ALARM

## Alarm Accessories

### AU-84T Shock Sensor:

Our dual zone Magnetic-Induction shock sensor with pre-warn output will detect sharp forceful blows a thief would use to break into your vehicle. A soft "bump" will cause the alarm to chirp warning the offender away. A hard hit will cause the siren to sound.



### AU-94 Proximity Sensor & AU-94T Dual Zone Proximity Sensor

Our popular single zone and dual zone "Radar" style sensors are designed to detect an intruder's presence and trigger your alarm before he actually touches your vehicle. Sensitivity range is fully adjustable on both sensors.



### AU-95T Dual Zone Air Pressure Sensor

As the newest sensor to our line, the AU-95T has been specifically designed to detect the sharp air pressure changes created inside a vehicle whenever a door is opened or closed. Both zones are independently adjustable for maximum efficiency.



Distributed By:

### Alarm Features

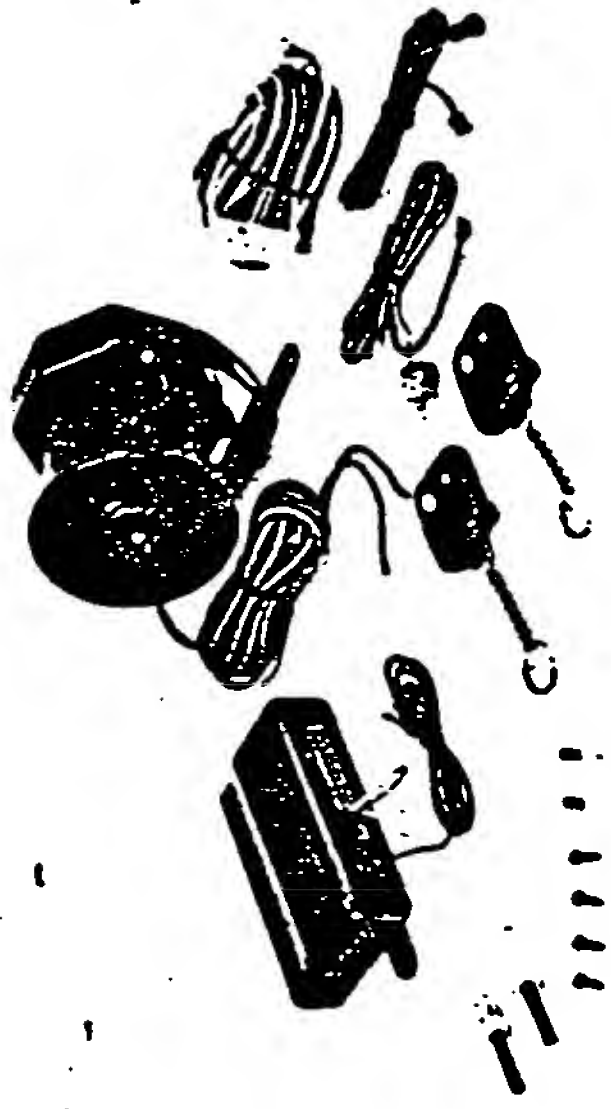
	FBI-517	FBI-515	FBI-411	FBI-410
One Piece Self-Contained Alarm System	x	x		
Transmitter Programmable Shock Sensor	x	x		
127dB Piezo Siren	x	x		
Built-In Shock Sensor	x	x		
Two Three Freq. Key Chain Transmitters	x	x		
Pre-warn Circuit	x	x		
CODE LEARNING Transmitters	x	x		
Remote Panic From Transmitters	x	x		
Scan Deterrent Receiver	x	x		
Arm Confirmation Chirp	x	x		
Dis-Arm Confirmation Chirp	x	x		
Auto. 60 Second Shutdown and Re-arm	x	x		
Door Open Auto Reset	x	x		
L.E.D. Status Indicator Light	x	x		
Negative Trigger Input	x	x		
Starter Interrupt Circuit	x	x		
Two Window Decals	x	x		
Limited Lifetime Warranty	x	x		
Parking Light Output	x	x		
Positive Trigger Input	x	x		
Door Lock / Unlock Output	x	x		
Modular Style Alarm System	x	x		
Trunk Release Output	x	x		
Valet Switch	x	x		
127dB Multi-Tone 12 Volt Siren	x	x		
Programmable Exit Delay	x	x		
Programmable Passive Arming	x	x		
Programmable Passive Door Locking	x	x		
CODE JUMPING™ Technology	x	x		

## FBI Car Alarm Limited Lifetime Warranty

FBI Car Alarm will repair or replace any factory defective electronic parts to the original owner for the lifetime of the vehicle in which it was originally installed FREE of charge for the first year with a nominal charge for labor, handling, and shipping thereafter. See the Owners Manual for complete warranty details.

FBI Car Alarm  
981 North Burnt Hickory Road  
Douglasville, Georgia 30134  
(404) 942-9876





## Models: FBI-515 & 517

Since 1970, More than 8 Million People Worldwide Have Trusted Their Vehicle's Security To The Makers Of FBI

FBI's high quality vehicle security systems give you total vehicle security, plus the luxury of remote control vehicle access, from a key-chain style remote transmitter. Enjoy the peace of mind of knowing that your alarm is alert to any attempt to tamper with your vehicle and that when you return, the system enables you to enter your vehicle swiftly and safely.

FBI Car Alarms include the following features:

- Confirmation Chirp** - Press the large button from your key-chain transmitter will in this system with one short audible chirp to confirm that the alarm is armed.

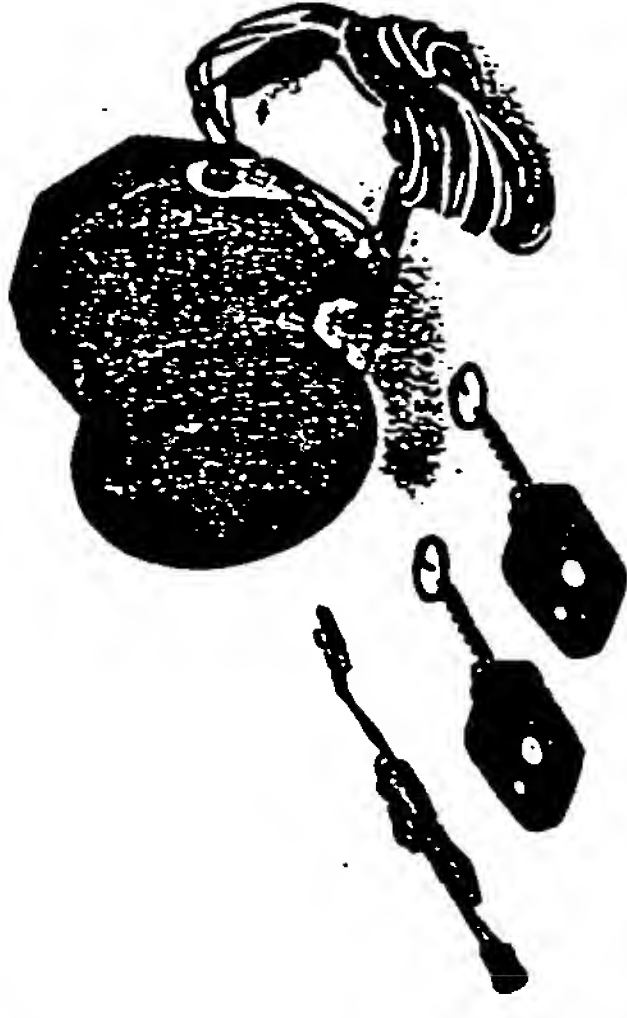
- Alarm Confirmation Chirp** - Pressing the large transmitter button once more will disarm the alarm system and is confirmed by two short audible siren chirps.

- CODE JUMPING and Scan Deterrent Receiver** - The FBI-517 Car Alarm features a scan deterrent receiver with millions of possible coding combinations. In addition, each time that you press the transmitter button the transmitter will jump to a new digital code. Therefore, you never transmit the same code twice, thus preventing a "code grabbing device" from operating your alarm system.

- Pre-warn Inputs** - The FBI-410 & 411 Car Alarms come with a pre-warn siren circuit that uses a built-in dual zone shock sensor to warn potential thieves to stay away from your car without triggering your FBI Car Alarm.

- 7dB Single Tone Plezo Siren** - The FBI-410 & 411 Car Alarms are capable of generating a sound of up to 127dB. This will create more than enough noise to warn you in the event of an alarm trigger and cause the thief to flee.

# FBI CAR ALARM



## Models: FBI-410 & 411

Have Trusted Car Alarms

In the event your car is broken into. It can also operate an optional Window Roll-up Module which will automatically roll up your car's windows when you arm your vehicle from your transmitter. Ask your dealer for details.

### Parking Light Output

This output will flash your vehicle's parking lights when you arm and disarm your alarm as well as flash the parking lights on and off while the alarm is sounding.

### Door Lock / Unlock / Trunk Release

Available with the FBI-515 & 517, a door lock output is featured that will lock and unlock your vehicle's electronic door locks when you arm and disarm your alarm. A trunk release output is also available with these models that can operate your vehicle's electronic trunk release from your alarm transmitter. Ask your dealer about installing these options.

### Passive Arming / Passive Door Locking

When programmed, the alarm will automatically arm itself six seconds after the last door is closed. When the passive door locking feature is selected and the optional door locking relays are installed, the alarm will also lock your vehicle's electronic door locks.

### Remote Panel From Transmitters

In the event that a threatening situation should arise, FBI Car Alarms can be triggered remotely from the alarm's transmitter by simply pressing the large button for three seconds. This is a very effective personal security measure when walking to and from your vehicle.

### Valet Switch

In the unlikely event that you should lose your transmitters, the alarm can be deactivated using the valet switch in conjunction with your ignition key to disarm your alarm.

### 60 Second Auto Shutdown and Rearm

Each FBI Car Alarm contains a 60-second automatic shutdown and rearm circuit which will keep the alarm legal within most local noise ordinances for alarm devices. The system will also rearm itself after the automatic shutdown has overridden any circuits that are defective or open at the time of rearming. This override circuit also works when you arm your alarm with a door open. The alarm will automatically arm and by-pass an open door or defective circuit until the door is closed or circuit repaired.

### LED Status Indicator Light

A LED Status Indicator Light comes with each alarm. When connected, it gives you a visual indication of the status of the alarm's operational modes.

### CODE LEARNING Alarm Modules

All FBI Alarms can be programmed to operate from up to four different transmitters. The alarm circuitry is designed to be intelligent enough to code itself to the transmitters that you select. You will never again have to cut traces or flip switches to make your transmitters work your alarm. Transmitter replacement is now a breeze. Nobody, not even your installer, will know what your transmitter code is.

### 127dB Multi-tone Siren

The FBI-515 & 517 alarm sirens can generate a loud 127dB multi-tone sound whose tones change more than 12 times a minute. The tones are distinctive enough to be recognized by you in the event your alarm is triggered.

### Starter Interrupt Circuit

When any FBI Car Alarm is armed, it creates a 500ma ground output that can be used to operate an optional Starter Disable Relay. This relay, when connected, will allow your alarm to disable your vehicle's starter and prevent it from operating



# Model APS 92BT

Owner's Manual

## Transmitter Programming Guide

**PRESTIGE**

### Transmitter Button Functions

The transmitters included in the security system kit are pre-programmed at the factory, with button # 1 assigned to channel one only. The suggested program arrangement is listed below. To program channel 2 and 3, please follow the programming instructions listed on pages two and three of this manual.

### Factory Settings for Transmitter Buttons

Button	Channel	System Function
Button #1	1	Remote Arm/Disarm Remote Emergency Panic Door Lock/Unlock (Optional)
Button #2	2	Pulsed Output *(Optional Devices)
Both Buttons	3	Switched Output *(Optional Devices)

\* Some of the more common accessories for these channels are:

AS 9151 Remote Car Starter

AS 9154 Remote Garage Door Interface

AS 9256 Remote Trunk Release Relay

AS 9153 Remote Window Roll Up